# <u>4.2.A.</u> 05130204010.

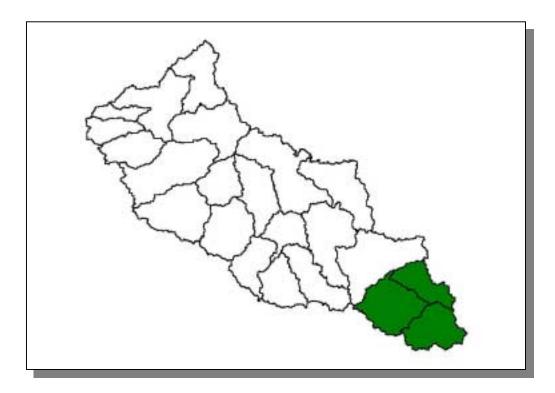


Figure 4-2. Location of Subwatershed 05130204010. All Harpeth HUC-14 subwatershed boundaries are shown for reference.

## 4.2.A.i. General Description.

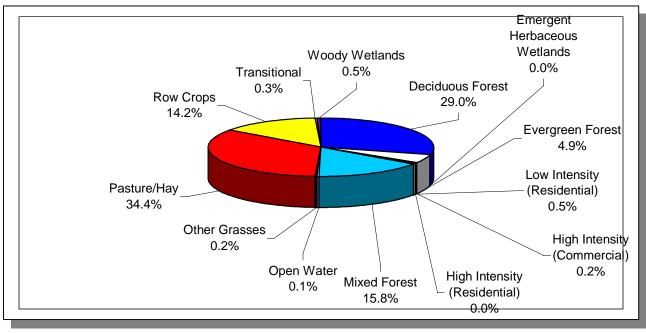


Figure 4-3. Land Use Distribution in Subwatershed 05130204010. More information is provided in Harpeth-Appendix IV.

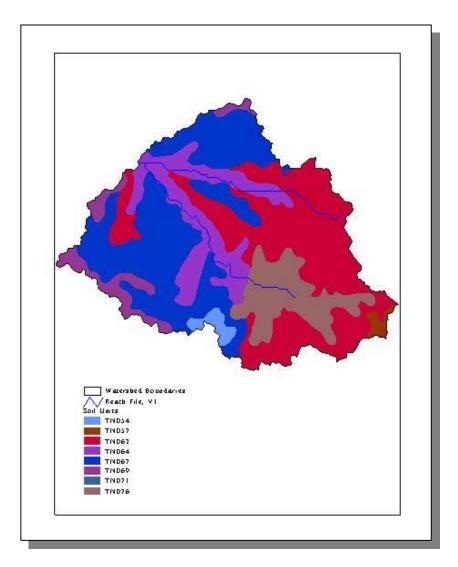


Figure 4-4. STATSGO (State Soil Geographic Database) Soil Map Units in Subwatershed 05130204010.

STATSGO MAP UNIT ID	PERCENT HYDRIC	HYDROLOGIC GROUP	PERMEABILITY (in/hour)	SOIL pH	ESTIMATED SOIL TEXTURE	SOIL ERODIBILITY
TN054	0.00	С	3.04	4.84	Loam	0.32
TN057	0.00	С	1.14	5.01	Clayey Loam	0.33
TN062	0.00	С	0.98	4.40	Clayey Loam	0.26
TN064	7.00	С	1.19	5.82	Silty Loam	0.37
TN067	2.00	С	2.69	5.51	Silty Loam	0.35
TN069	0.00	С	2.06	5.36	Loam	0.34
TN071	0.00	С	2.37	5.70	Silty Loam	0.33
TN076	28.00	С	0.73	6.26	Silty Clayey Loam	0.33

Table 4-2. Soil Characteristics by STATSGO (State Soil Geographic Database) Soil Map Units in Subwatershed 05130204010. More details are provided in Harpeth-Appendix IV.

	COUNTY POPULATION			ESTIMATED POPULATION IN WATERSHED		% CHANGE
County	1990	1997 Est.	Portion of Watershed (%)	1990	1997	
Bedford	30,411	34,203	0.1	29	33	13.8
Rutherford	118,570	159,987	7.97	9,450	12,751	34.9
Williamson	81,021	111,453	9.71	7,869	10,824	37.6
Totals	<b>230,002</b>	<b>305,643</b>		<b>17,348</b>	<b>23,608</b>	<b>36.1</b>

Table 4-3. Population Estimates in Subwatershed 05130204010.

				NUMBER OF H	<b>DUSING UNITS</b>	3
Populated Place	County	Population	Total	Public Sewer	Septic Tank	Other
Eagleville	Rutherford	491	220	5	211	4

Table 4-4. Housing and Sewage Disposal Practices of Select Communities in Subwatershed 05130204010.

#### 4.2.A.ii Point Source Contributions.

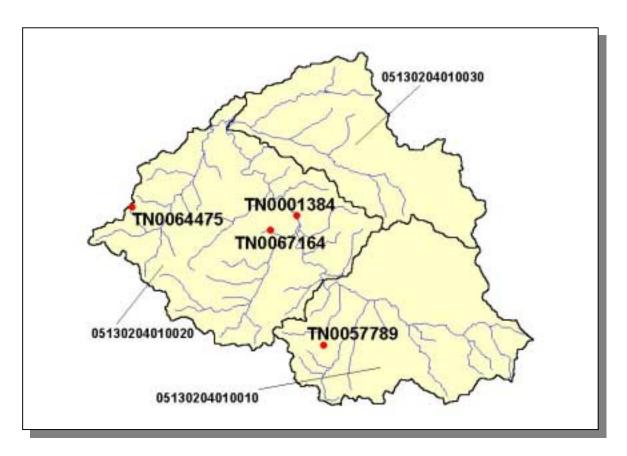


Figure 4-5. Location of Active Point Source Facilities (Individual Permits) in Subwatershed 05130204010. Subwatershed 05130204010010, 05130204010020, and 05130204010030 boundaries are shown for reference. More information, including the names of facilities, is provided in Harpeth-Appendix IV.

### 4.2.A.ii.a. Dischargers to Water Bodies Listed on the 1998 303(d) List

There are two NPDES facilities discharging to water bodies listed on the 1998 303(d) list in Subwatershed 05130204010:

- TN0001384 discharges to the Harpeth River at RM 110.3
- TN0057789 discharges to Cheatham Branch at RM 1.9

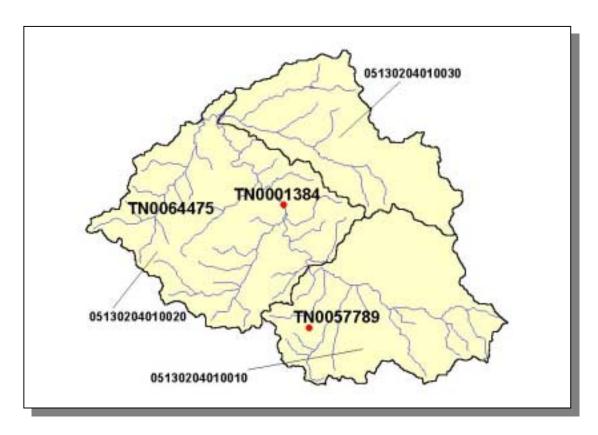


Figure 4-6. Location of NPDES Dischargers to Water Bodies Listed on the 1998 303(d) List in Subwatershed 05130204010. Subwatershed 05130204010010, 05130204010020, and 05130204010030 boundaries are shown for reference. The names of facilities are provided in Harpeth-Appendix IV.

PERMIT#	7Q10	1Q20	30Q2	QDESIGN	QLTA
TN0001384	0	0	3.517		0.027
TN0057789	0	0	0	0.018	

Table 4-5. Receiving Stream Flow Information for NPDES Dischargers to Waterbodies Listed on the 1998 303(d) List in Subwatershed 05130204010. Data are in million gallons per day (MGD). 30Q2 data were calculated using the equation method (TN0001384) or using data in Flow Duration and Low Flows of Tennessee Streams Through 1992 (TN0057789).

PERMIT #	CBOD <sub>5</sub>	NH <sub>3</sub>	FECAL	METAL	WET
TN0001384	Х	Х		Χ	Χ
TN0057787	Х	Х	Х		

Table 4-6. Monitoring Requirements for NPDES Dischargers to Waterbodies Listed on the 1998 303(d) List in Subwatershed 05130204010.

PERMIT #	As	Zn	Sb	Pb	TSS	NH <sub>3</sub> (Summer)	NH <sub>3</sub> (Winter)	CBOD
TN0001384	X	Χ	Χ	Χ				
TN0057787					Χ	X	X	Χ

Table 4-7. Parameters Monitored for Daily Maximum (mg/L) Limits for NPDES Dischargers to Waterbodies Listed on the 1998 303(d) List in Subwatershed 05130204010.

PERMIT#	Sb	Zn	Pb
TN0001384	3	3	1

Table 4-8. Number of Permit Violations Based on DMR Data (10/31/95-07/31/97) for NPDES Dischargers to Waterbodies Listed on the 1998 303(d) List in Subwatershed 05130204010.

## 4.2.A.iii. Nonpoint Source Contributions.

LIVESTOCK (COUNTS)						
Beef Cow	Cattle	Milk Cow	Chickens	Chickens Sold	Hogs	Sheep
7.030	14.160	754	19	91.480	563	172

**Table 4-9. Summary of Livestock Count Estimates in Subwatershed 05130204010.** According to the Census of Agriculture, "Cattle" includes heifers, heifer calves, steers, bulls and bull calves.

	INVEN	ITORY	REMOVAL RATE		
County	Forest Land (thousand acres)	Timber Land (thousand acres)	Growing Stock (million cubic feet)	Sawtimber (million board feet)	
Bedford	74.6	74.6	0.5	1.3	
Rutherford	155.7	155.7	0.4	0.9	
Williamson	142.0	142.0	1.0	3.3	
Totals	372.3	372.3	1.9	5.5	

Table 4-10. Forest Acreage and Annual Removal Rates (1987-1994) in Subwatershed 05130204010.

CROPS	TONS/ACRE/YEAR
Non Agricultural Land Use	0.00
Berry (Horticultural)	0.47
Corn (Row Crops)	4.57
Soybeans (Row Crops)	3.11
Cotton (Row Crops)	4.79
Grass (Hayland)	0.16
Legume (Hayland)	0.67
Legume/Grass (Hayland)	0.31
Grass (Pastureland)	0.72
Legume (Pastureland)	0.23
Grass, Forbs, Legumes (Mixed Pasture)	0.48
Forest Land (Grazed)	0.00
Forest Land (Not Grazed)	0.00
Farmsteads and Ranch Headquarters	0.39
Conservation Reserve Program Land	0.19
Tobacco (Row Crops)	6.75
Wheat (Close Grown Cropland)	1.28
Other Cropland (Not Planted)	6.46
Other Land in Farms	0.12
Summer Fallow (Other Cropland)	4.60

Table 4-11. Annual Estimated Total Soil Loss in Subwatershed 05130204010.